



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/711,341	09/12/2004	Andy Chiu	VIAP0140USA	5340
27765	7590	11/19/2007		
NORTH AMERICA INTELLECTUAL PROPERTY CORPORATION P.O. BOX 506 MERRIFIELD, VA 22116			EXAMINER EKPO, NNENNA NGOZI	
			ART UNIT	PAPER NUMBER
			2623	
			NOTIFICATION DATE	DELIVERY MODE
			11/19/2007	ELECTRONIC

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

winstonhsu.uspto@gmail.com  
Patent.admin.uspto.Rcv@naipo.com  
mis.ap.uspto@naipo.com.tw

## Office Action Summary

**Application No.**

10/711,341

**Applicant(s)**

CHIU, ANDY

**Examiner**

Nnenna N. Ekpo

**Art Unit**

2623

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☐ Responsive to communication(s) filed on \_\_\_\_.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-10 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-10 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 12 September 2004 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO/SB/08)  
Paper No(s)/Mail Date See Continuation Sheet.
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_.
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: \_\_\_\_.

Continuation of Attachment(s) 3). Information Disclosure Statement(s) (PTO/SB/08), Paper No(s)/Mail Date :07/28/2005, 07/29/2005 & 8/21/2007.

## DETAILED ACTION

### *Priority*

1. Receipt is acknowledged of paper submitted under 35 U.S.C. 119(a)-(d), which papers have been placed of record in the file.

### *Information Disclosure Statement*

2. The references listed in the Information Disclosure Statement filed on July 28, 2005, July 29, 2005 and August 21, 2007 has been considered by the examiner (see attached PTO-1449 form).

### *Claim Rejections - 35 USC § 102*

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

4. **Claims 1, 4-6 and 9-10** are rejected under 35 U.S.C. 102(b) as being anticipated by Iggulden (US Patent Number 6,002,443).

Regarding **claim 1**, Iggulden discloses a method for detecting an advertising section within a video signal comprising:

(a) storing at least one reference frame (signature pattern) (see abstract, lines 24-29 and column 5, lines 17-43, when a signature pattern is recognized, it is stored in the database);

Art Unit: 2623

(b) comparing each frame of the video signal (segment of the television signal) with each reference frame (signature pattern) and generating a result (see abstract, lines 5-17 and column 4, lines 51-64); and

(c) determining which frames of the video signal belong to the advertising section according to the result (see column 9, lines 66-67 and column 10, lines 1-10, the detector unit (fig 1 (110) determines if the segment matches any of the signature pattern and then generates a result).

Regarding **claim 6**, Iggulden discloses a signal processing system for detecting an advertising section within a video signal comprising (see column 1, lines 10-13):

a memory for storing at least one reference frame (signature pattern) (see abstract, lines 24-29 and column 5, lines 17-43, when a signature pattern is recognized, it is stored in the database, also see fig 1 (128));

a buffer module for storing the video signal, the video signal capable of providing a plurality of frames in sequence for displaying dynamic images (see fig 1 (150) and column 8, lines 41-54, the temporary storage unit is considered as a buffer which stores the video and audio signals received from the broadcasting station and then displayed on the television monitor);

a comparison module for comparing a similarity of each frame of the video signal (segment of the television signal) and each reference frame (signature pattern) and generating a result (see abstract, lines 5-17 and column 4, lines 51-64); and

Art Unit: 2623

a decision module for deciding which frames of the video signal belong to the advertising section according to the result (see column 9, lines 66-67 and column 10, lines 1-10, the detector unit (fig 1 (110) determines if the segment matches any of the signature pattern and then generates a result).

Regarding **claim 4**, Iggulden discloses everything claimed as applied above (see *claim 1*). The method wherein step (a) comprises: (d) broadcasting a reference video signal, the reference video signal capable of providing a plurality of frames in sequence for displaying dynamic images (see abstract, lines 1-5 and column 4, lines 39-44, the commercial advertisement (reference video signal) is broadcasted and displayed (muting the video and audio portions)); and

(e) after a user assigns a frame from the reference video signal, recording the frame assigned by the user as a reference frame (see column 5, lines 17-43).

Regarding **claim 9**, Iggulden discloses everything claimed as applied above (see *claim 6*). The signal processing system further comprising an interface module for receiving a frame assigned by a user from a reference video signal, the memory storing the reference frame received by the interface module (see column 23, lines 46-67 and column 24, lines 1-16).

Regarding **claims 5 and 10**, Iggulden discloses everything claimed as applied above (see *claims 1 and 6*). The method wherein when performing step (a), calculating

Art Unit: 2623

representation value corresponding to each reference frame and storing the representation value (see column 14, lines 9-40), and when performing step (b), calculating representation value corresponding to each frame of the video signal and comparing the representation value of each frame of the video signal with the representation value of each reference frame for generating the result (see column 4, lines 39-67 and column 5, lines 1-16).

***Claim Rejections - 35 USC § 103***

5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

6. **Claims 2-3 and 7-8** are rejected under 35 U.S.C. 103(a) as being unpatentable over Iggulden (US Patent Number 6,002,443) as applied to *claims 1 and 6* above, and further in view of Buhro et al. (US Patent Number 5,440,336).

Regarding **claims 2 and 7**, Iggulden discloses everything claimed as applied above (see *claims 1 and 6*). However, Iggulden fails to specifically disclose if a similarity of a frame of the video signal and a reference frame is greater than a predetermined similarity, the frame of the advertising section is before the frame of the video signal.

Art Unit: 2623

Buhro et al. discloses if a similarity of a frame of the video signal and a reference frame is greater than a predetermined similarity, the frame of the advertising section is before the frame of the video signal (see column 18, lines 24-33).

Therefore, it would have been obvious to a person of ordinary skill in the art at the time the invention was made to modify Iggulden's invention with the above mentioned limitation as taught by Buhro et al. for the advantage of identifying an incoming commercial/advertisement.

Regarding **claims 3 and 8**, Iggulden discloses everything claimed as applied above (see *claims 1 and 6*). However, Iggulden fails to specifically disclose if a similarity of a frame of the video signal and a reference frame is greater than a predetermined similarity, the frame of the advertising section is after the frame of the video signal.

Buhro et al. discloses if a similarity of a frame of the video signal and a reference frame is greater than a predetermined similarity, the frame of the advertising section is after the frame of the video signal (see column 18, lines 24-33).

Therefore, it would have been obvious to a person of ordinary skill in the art at the time the invention was made to modify Iggulden's invention with the above mentioned limitation as taught by Buhro et al. for the advantage of identifying a commercial/advertisement.



***Citation of Pertinent Prior Art***

7. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Iggulden et al. (US Patent Number 5,333,091).

***Conclusion***

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Nnenna N. Ekpo whose telephone number is 571-270-1663. The examiner can normally be reached on Monday - Friday 7:30 AM-5:00 PM EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Vivek Srivastava can be reached on 571-272-7304. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a

Application/Control Number: 10/711,341

Page 8

Art Unit: 2623

USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

NNE/nne  
November 2, 2007

  
BRIAN TYRONE PENDLETON  
SUPERVISORY PATENT EXAMINER